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# <u>REMARKS</u>

Claims 1, 12, 23, 27, 28, 30, 39 and 49 are amended. Claims 1-25 and 27-51 remain in the application for consideration. In view of the following remarks, Applicant traverses the Office's rejections and respectfully requests that the application be forwarded on to issuance.

## §102 and 103 Rejections

Claims 1-3, 5-7, 9-13, 17-19, 21-24, 27-32, 36-40, 44-45 and 47-50 stand rejected under 35 U.S.C. §102(e) as being anticipated by U.S. Patent No. 6,269,195 to Gonsalves et al. (hereinafter "Gonsalves").

Claims 4, 8, 14-16, 20, 25, 33-35, 41-43, 46 and 51 stand rejected under 35 U.S.C. §103(a) as being obvious in view of Gonsalves.

Before undertaking a discussion of the substance of the Office's rejections, the following discussion of Applicant's disclosure and the reference to Gonsalves is provided in an attempt to assist the Office in appreciating certain distinctions between the claimed subject matter and Gonsalves.

## Applicant's Disclosure

Transitions from one video to another can be implemented in different ways. One popular way of implementing a transition is through the use of a bitmap and in particular, a gray scale bit map. Other types of bits maps however, e.g. color bit maps, can be used. Typically, gray scale bitmaps, used for transitions, are individually designed by a human designer with the aid of a

software application. The use of a gray scale bit map allows one video to visually replace another video in often times creative ways.

Fig. 40 shows an exemplary gray scale bit map generally at 4000 and a display 4002 that contains two videos 4004 and 4006 that are in the midst of a transition called a "wipe". In the illustrated wipe effect, video 4006 constitutes the old video and video 4004 constitutes the new video. A boundary line 4008 can be seen between the two videos and is moving to the right. As the boundary line moves to the right, more and more of video 4004 replaces video 4006. To effect this transition, bit map 4000 is used in the following way.

Bit map 4000 includes a large number of pixels, e.g. 300x300 or 90,000 pixels. Each pixel is capable of having a value which is one of a predetermined number of gray scale values which represent shades of gray. For example, in this case, assume that there are 256 shades of gray, each ranging in value from 0 (black) to 255 (white). Pixels at the far left of bitmap 4000 have gray scale values that are lower than pixels at the far right of the illustrated bitmap. A programmatic loop is defined such as that illustrated below:

For Z = 0 to 255,

Walk the picture

If (color < Z) show the new video, else show the old video

What this loop does is that it walks through the bitmap for each frame of video. If pixel values in the bitmap are less than Z for a given frame, the new video is shown. If the pixel values for a given frame are greater than Z, then the old video is shown. In the Fig. 40 example, on the first pass (for the first frame), Z=0. Since no pixels are less than 0, the new video is not shown. As Z gets

incremented and one proceeds through the bitmap, the new video slides in from the left. Algorithms such as this can be used to implement hundreds of different kinds of effects and transitions, just by changing the bitmap.

As an example of another type of transition that can be implemented using gray scale bit maps, consider Fig. 41. There, a bitmap 4100 in the form of a dark star in the middle, with lighter and lighter stars surrounding the dark star is shown. When this bitmap is used to effect a transition between videos, a small star emerges from the middle of the display and grows in time so that the new video replaces the old video. For example, in display 4102, a new video 4104 is shown replacing old video 4106 and is emerging through a star wipe that is provided by bitmap 4100.

# **The Gonsalves Reference**

Gonsalves does not deal with nor concern itself with transitions from one video to another. Rather, Gonsalves pertains to forming a *composite image* from first and second images. The composite image retains aspects of each of the first and second images. Thus, to this extent, there is *no transition* whatsoever as that term is utilized in the claims and the specification.

An appreciation of Gonsalves begins with its Fig. 1 and the related discussion in the specification. Specifically, Gonsalves describes what is known as "feathering", which is a special effect that blurs one or more portions of a video image to create a composite video image from a foreground image and a background image. Gonsalves instructs that a graphics editor typically feathers the border between the images to blend the images together to create an effect that the two images are truly one image. For example, a composite image including a

 foreground image of two people walking and a background image of a desert scene, when feathered, provides an appearance of the two people walking in the desert.

Fig. 1 illustrates images that are manipulated to form a composite image. Gonsalves instructs that the graphics editor takes a foreground image 24 from a first image 20, and a background image 26 from a second image 28, and combines them using a matte image 32 to form a composite image 38. The matte image is a gray scale image used to generate the composite image 38. In particular, as Gonsalves instructs, the light area of the matte image indicates that the area 24 of the first image 20 is to be used as the foreground image, and that the area 22 is to be ignored. Similarly, the dark area 36 of the matte image indicates that the area 26 of the second image 28 is to be the used as the background image.

Before generating the composite image 38, the graphics editor modifies the matte image so that the graphics workstation generates a feathering effect between the foreground and background images 24 and 26. In particular, the border area between the light and dark area of the matte image is filtered. If the matte image uses a gray scale that ranges between 0 and 255, the dark area for the background is 0, the light area for the foreground is 255, and the border area between the dark area and light area has values between 0 and 255 depending on the type of filtering applied to the matte image. The degree of realism in the composite image 38 often depends on the type of filtering. When filtering is poor, the viewer may identify a border 36 between the foreground image and the background image so that the effect of interaction between objects in the two images is diminished or lost.

Gonsalves goes on to describe an approach that allegedly improves upon past feathering approaches. Gonsalves approach involves filtering and processing

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an original matte image in a particular way to provide a so-called box-filtered processed matte image. This box-filtered processed matte image is then used to create the composite image.

# The Claim Rejections

Claim 1 has been amended and, as amended, recites a softwareimplemented video rendering system comprising [added language appears in bold italies]:

- a video application configured to enable a user to combine multiple different video clips; and
- a bitmap processor operatively coupled with the video application and configured to receive a first bitmap that can be used to render a transition between video clips and automatically process the first bitmap to provide a different transition between video clips, wherein the first bitmap does not comprise video clip content, and wherein the transitions are configured to enable one video clip to completely replace another video clip.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the transitions are configured to enable one video clip to completely replace another video clip.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The

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composite image contains features from both the first and the second image (sec, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 2-11 depend from claim 1 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 1, are neither disclosed nor suggested in the references of record, either singly or in combination with one another. In addition, claims 4 and 8 stand rejected under § 103 over Gonsalves. However, given the allowability of claim 1 over Gonsalves as discussed above, claims 4 and 8 are allowable as depending from an allowable base claim.

Claim 12 has been amended and, as amended, recites a method of displaying a video comprising [added language appears in bold italics]:

- selecting a bitmap that defines a first transition that can be used to transition between video clips;
- operating upon the bitmap to provide a second transition that is different from the first transition by using one or more parameters that are provided by a user, the parameters being used to operate upon the bitmap; and
- effecting the second transition between video clips, wherein said effecting comprises completely replacing one video clip with another video clip.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the act of effecting comprises completely replacing one video clip with another video clip.

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24 25 Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from both the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 13-22 depend from claim 12 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 12, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

In addition, claims 14-16 and 20 stand rejected under §103 over Gonsalves. However, given the allowability of claim 12, these claims are allowable as depending from an allowable base claim.

Claim 23 has been amended and, as amended, recites a method of displaying a multi-media editing project comprising [added language appears in bold italics]:

- receiving one or more parameters from a user, the parameters being associated with a multi-media editing project and relating to a transition that can be applied between two video clips in the project;
- selecting a bitmap that defines a first transition that can be used to transition between the video clips;
- operating upon the bitmap to provide a second transition that is different from the first transition by using the one or more parameters; and
- effecting the second transition between video clips, wherein said effecting comprises completely replacing one video clip with another video clip.

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In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the act of effecting comprises completely replacing one video clip with another video clip.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from both the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 24 and 25 depend from claim 23 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 23, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

Claim 27 has been amended and, as amended, recites one or more computer-readable media having computer-readable instructions thereon which, when executed by a computer, cause the computer to [added language appears in bold italics]:

- select a first bitmap that defines a transition that can be applied between two video clips in a video editing project;
- operate upon the first bitmap to provide a second bitmap that is different from the first bitmap by using one or more parameters that are provided by a user, the first bitmap being operated upon by

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- operations comprising one or more of the following operations: stretching, shrinking, replicating, and offsetting, and
- use the second bitmap in a transition between at least two videos, wherein said transition completely replaces one video with another video.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the transition completely replaces one video with another video.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from both the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claim 28 has been amended and, as amended, recites a softwareimplemented method of displaying a multi-media editing project comprising [added language appears in bold italics]:

- providing a user interface (UI) through which a user can enter one or more parameters that can be used to manipulate a bitmap-defined transition;
- receiving one or more parameters that are entered by a user via the UI:
- selecting a first bitmap that defines a transition and is associated with the one or more parameters entered by the user;
- automatically operating upon the first bitmap to provide a second bitmap that defines a transition that is different from the transition defined by the first bitmap by using the one or more parameters that

are provided by a user, said operating comprising performing one or more of the following operations on the first bitmap: stretching, shrinking, replicating, and offsetting; and

 using the second bitmap in a transition between at least two videos, wherein said transition completely replaces one video with another video.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the transition completely replaces one video with another video.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from **both** the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claim 29 depends from claim 28 and is allowable as depending from an allowable base claim. This claim is also allowable for its own recited features which, in combination with those recited in claim 28, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

Claim 30 has been amended and, as amended, recites a multi-media project editing system comprising [added language appears in bold italics]:

 a software implemented bitmap processor configured for use in connection with a multi-media editing application to effect a

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transition between different videos, the bitmap processor being configured to:

- o receive one or more parameters from a user;
- select a first bitmap that defines a first transition between two videos;
- o operate upon the first bitmap in accordance with the one or more parameters to provide a second transition that is different from the first transition; and
- o apply the second transition between two videos, wherein said second transition completely replaces one video with another video.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the second transition completely replaces one video with another video.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from both the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 31-38 depend from claim 30 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 30, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

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In addition, claims 33, 34 and 35 stand rejected under §103 over Gonsalves. Given the allowability of claim 30, these claims are allowable as depending from an allowable base claim.

Claim 39 has been amended and, as amended, recites a method of displaying a multi-media editing project comprising [added language appears in bold italics]:

- selecting a first bitmap comprising multiple pixels, each pixel being capable of having one of a number of predetermined of gray scale values, the first bitmap defining a transition between two videos in a multi-media editing project;
- operating upon the selected first bitmap to provide a second bitmap that is different from the first bitmap by using one or more parameters that are provided by a user, the second bit map defining a different transition;
- rescaling the second bitmap to ensure that pixels of the second bit map have, collectively, all of the predetermined gray scale values; and
- using the second bitmap in a transition between at least two videos, wherein said transition completely replaces one video with another video.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the transition completely replaces one video with another video.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a *composite image*. The

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composite image contains features from **both** the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 40-48 depend from claim 39 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 1, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

In addition, claims 41-43 and 46 stand rejected under §103 over Gonsalves. Given the allowability of claim 39, these claims are allowable as depending fro an allowable base claim.

Claim 49 has been amended and, as amended, recites a method of displaying a multi-media editing project comprising [added language appears in bold italies]:

- receiving one or more parameters from a user, the parameters being associated with a multi-media editing project and relating to a transition that can be applied between two video clips in the project;
- selecting a bitmap that defines a first transition that can be used to transition between the video clips;
- operating upon the bitmap to provide a second transition that is different from the first transition by using the one or more parameters; and
- · effecting the second transition between video clips,
- wherein said receiving comprises receiving parameters that define a
  range that, in turn, defines a border thickness of a border that is used
  in connection with the first-mentioned bitmap to effect the second
  transition, wherein said second transition completely replaces one
  video with another video.

In making out the rejection of this claim, the Office argues that Gonsalves anticipates this claim citing to sections in Gonsalves that were previously used in making out this claim's rejection. While applicant disagrees with the Office's rejection, Applicant has amended this claim to clarify that the second transition completely replaces one video with another video.

Gonsalves neither discloses nor suggests any such subject matter. Rather, Gonsalves teaches directly away from the recited subject matter by disclosing a system that feathers a first and second image to create a composite image. The composite image contains features from both the first and the second image (see, e.g. Fig. 1 and the related discussion).

Accordingly, for at least this reason, this claim is allowable.

Claims 50 and 51 depend from claim 49 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 49, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

In addition, claim 51 stands rejected under §103 over Gonsalves. Given the allowability of claim 49, this claim is allowable as depending from an allowable base claim.

#### Conclusion

All of the claims are in condition for allowance. Accordingly, Applicant requests a Notice of Allowability be issued forthwith. If the Office's next anticipated action is to be anything other than issuance of a Notice of Allowability,

Applicant respectfully requests a telephone call for the purpose of scheduling an interview. Respectfully Submitted, Lance R. Sadler Reg. No. 38,605 (509) 324-9256